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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/050,248	01/16/2002	Caijun Shi	33211.0009	9950

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EXAMINER	
MARCANTONI, PAUL D	
ART UNIT	PAPER NUMBER
1755	

DATE MAILED: 02/27/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	10/050,248	SHI ET AL.
	Examiner	Art Unit
	Paul Marcantoni	1755

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *29 December 2003* .

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-37* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-37* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____ .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

Applicant's arguments filed 12/29/03 have been fully considered but they are not persuasive.

Rejection:

Claims 1-37 are rejected under 35 U.S.C. 102(a,b,and/or e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Plungian et al., Cornwell, Nisnevich et al., Spinney, Dudley et al., PL 126204 (Stokosa et al.), JP 61031371 (Kikuchi et al.), SU 1219575 (Fedynin et al.), FR 2599360 (Royer), SU 1578113 (Volzhenskii et al.), SU 1585309 (Fedynin), SU 1742271 (Fedynin et al.), Okami et al. (JP 11236260), or Weiss et al. (RO 112843).

Note:Nisnevich et al. has been withdrawn because he teaches a monolithic concrete which is different than a cellular concrete. (See col.1, lines 19-24).

All of the above cited references teach a cellular cement/concrete composition comprising cement, lightweight aggregate (as defined by applicants), lime containing material, and water in amounts anticipating the instant invention. The method would appear to be routine mixing, pouring, and setting conventionally done for concrete. Even assuming the invention is not anticipated, overlapping ranges have amounts have also been held to be prima facie obvious to one of ordinary skill in the art. It is also noted that since applicants composition can contain zero weight percent cement substitute it need not be in the composition. Further, it is conventional and would appear notorious to one of ordinary skill in the art to add commonly used additives such as shrinkage reducing agents, and gas forming or foaming agent.

New Matter Rejection:

Claims 1-37 are rejected under the first paragraph of 35 USC 112 and 35 USC 132 as the specification as originally filed does not provide support for the invention as is now claimed.

Independent claims 1 and 20 have newly added limitations that would not appear supported by the orignal disclosure. Applicants are respectfully requested to specifically point out and show where they have support for these new limitations. Specifically, support for "decreases shrinkage and eliminate shrinkage cracking while reducing density of concrete; increase flexural strength, plasticity, and impact resistance of the concrete" (claim 1) and "fiber stabilizing the cellular structure and the aggregate in the concrete mixture" and "the fiber increasing flexural strength, plasticity and impact resistance of the cured concrete". If they show support, the rejection will be withdrawn.

The applicants' actual addition of these new claims necessitated this new grounds of rejection.

35 USC 112 Second Paragraph:

Claims 1-37 are rejected under 35 U.S.C. 112, second paragraph, as failing to set forth the subject matter which applicant(s) regard as their invention.

The terms "low density" and "low" shrinkage are indefinite in claim 1. The term low is a relative and indefinite term Should applicants present a range of what they consider low (e.g. claim 2) for density in claims 1 and 20, the rejection would be

withdrawn. Also, the same is required for shrinkage. What is the numerical range? This also needs to be in the claim for withdrawl of this indeiniteness rejection.

The terms "selected to" should be amended to ---effective to—in claim 1 b) and c).

Response to Arguments:

The Nisnevich et al. reference has been withdrawn as a result of applicants arguments. The applicants argue the Plugian and Cornwell reference and state that they do not teach strength values. The examiner disagrees. Applicants are referred to column 1, lines 55-60, wherein both references teach strength values of 20 to 90 pounds per cubic foot.

The applicants argue that Plugian and Cornwell are non-structural applications allegedly versus their own. The examiner notes that the compositions are the same and the new use of a known composition is not a patentable distinction.

The applicants argue Spinney does not provide any strength values either. The examiner disagrees. Applicants are referred to column 8, lines 28-30 wherein Spinney teaches bulk density values of about 95 pounds/cubic foot.

The applicants argue that Dudley and Kikuchi does not teach the strength values of the instant invention and are low strength (less than 10 lb/cubic ft for Dudley.). Yet, the applicants argue features or limitations not present in their own claims. Had applicants inserted claim 2 into all independent claims, then this would be true. However, absent a limitation for strength in the independent claim, the applicants argue a feature not claimed. While it is true that the claims may be read in light of the

specification, it is improper to read the limitations of the specification into the claims. In re Yamato, 222 USPQ 93; In re Wilson, 149 USPQ 523; Graver Tank v. Linde Air Products Co. 80 USPQ 451 (Supreme Court). This can be easily resolved by insertion of claim 2 into all independent claims to remove the Dudley reference.

The applicants argue that Fedynin teaches curing by autoclaving which is not done for their claimed invention. In rebuttal, even if the process of making is different, "Product by Process claims do not patentably distinguish the product of reference even though made by a different process." In re Thorpe , 227 USPQ 964. In other words, even if applicants make the claimed cellular concrete product by a different method, it does not teach away from the claimed product if the claimed product is still the same.

Further, Fedynin teaches curing the concrete in a moist environment. It would seem that autoclaving is a curing in a steam or moist environment so it still reads upon the applicants instantly claimed invention (see applicants claim 20).

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Paul Marcantoni whose telephone number is 571-272-1373. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark Bell, can be reached at 571-272-1362 The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Paul Marcantoni
Primary Examiner
Art Unit 1755